



IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant: Jules Olita et al. : January 10, 2007
Serial No.: 10/034,428 : Art Unit 2621
Filed: December 27, 2001 : Examiner: Heather Rae Jones
For: HELMET-MOUNTED THERMAL IMAGING SYSTEM

Commissioner for Patents
Mail Stop Amendment
PO BOX 1450
Alexandria, VA 22313-1450

DECLARATION UNDER 37 C.F.R. § 1.131

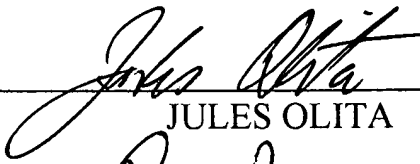

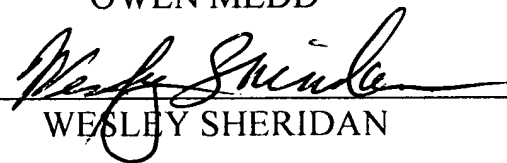
To The Commissioner:

JULES OLITA, OWEN MEDD and WESLEY SHERIDAN, declare and state the following:

1. That we are the joint inventors of the subject invention described and claimed in the above-identified patent application;
2. That at all times material hereto, we worked in the employ of Sage Technologies, Ltd. ("Sage"), the assignee of all rights, title and interest to the subject invention and of the above-identified patent application;
3. That prior to June 14, 2001, the effective date of the Del Bianco et al. reference (EP 1 107 041 A1) currently applied as prior art to reject Claims 1, 2, 7 and 8 under 35 U.S.C. 102(a) and Claims 3, 5, 9 and 11 under 35 U.S.C. 103(a), we conceived the invention as claimed in said application in this country and further reduced said invention to writing

- in this country, as evidenced in drawings attached hereto as Exhibits A1 and A2, which drawings were prepared and completed at our direction and control prior to said effective date of the Del Bianco et al. reference;
4. That on June 13, 2001, prior to the effective date of the Del Bianco reference, at a meeting at Sage offices, we presented a design model of the invention to Patent Counsel, Armand M. Vozzo, Jr., Esquire, U.S. Patent Reg. No. 28,918, for docketing and patent consideration;
 5. That from mid-June to mid-September 2001, we completed design specifications, and production and assembly drawings of the subject invention, as evidenced in the attached Exhibits B1-B5, all of such work activity being done in this country.
 6. That during August and September 2001, we procured major design components of the invention, including the required infrared camera, its design housing and visual display, and completed fabrication and production of a working prototype of the invention, as evidenced in the attached Exhibits C1-C5, with all of such work activity being done in this country;
 7. That on September 25, 2001, we presented and successfully demonstrated a working prototype of the invention at the Redmond Symposium of the International Association of Fire Fighters (IAFF) meeting in Phoenix, Arizona, evidenced by the attached Exhibit D1 representing a photograph of the invention used in a slide presentation associated with the demonstration.
 8. That based upon our submission of the final design specifications and the production and assembly drawings of the working prototype to said Patent Counsel, the above-identified patent application was completed and filed on December 27, 2001.

We further declare that all statements made herein of our own knowledge are true and that all statements made on information and belief are believed to be true, and that all statements are made with the knowledge that willful false statements and the like are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful statements may jeopardize the validity of the application or any patent issuing thereon.

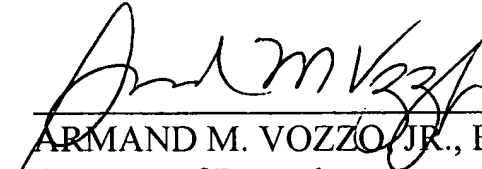
	1-10-07
JULES OLITA	Date
	1/10/07
OWEN MEDD	Date
	1/10/2007
WESLEY SHERIDAN	Date

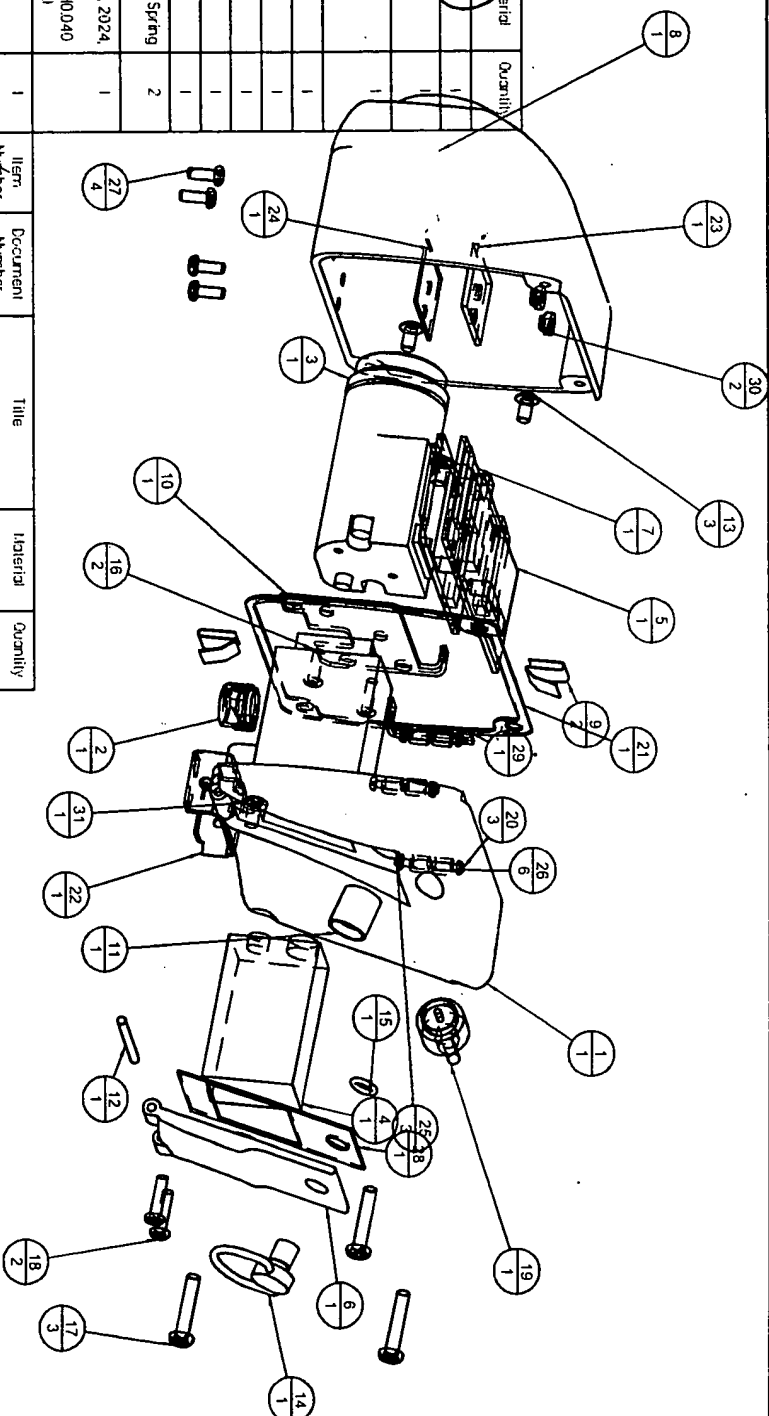
CERTIFICATE OF MAILING

I hereby certify that this correspondence is being deposited with the United States Postal Service as first class mail in an envelope addressed to: Commissioner for Patents, Mail Stop Amendment, PO BOX 1450, Alexandria, VA 22313-1450,

on January 12, 2007.

Date: 1-12-07


ARMAND M. VOZZO JR., ESQUIRE
Attorney of Record



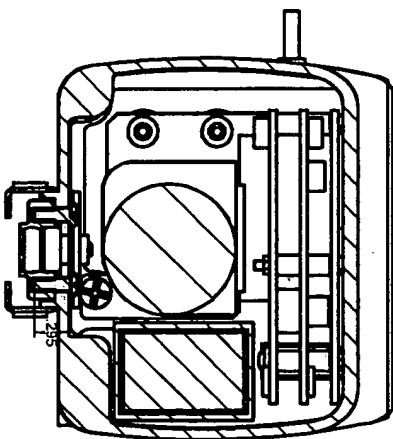
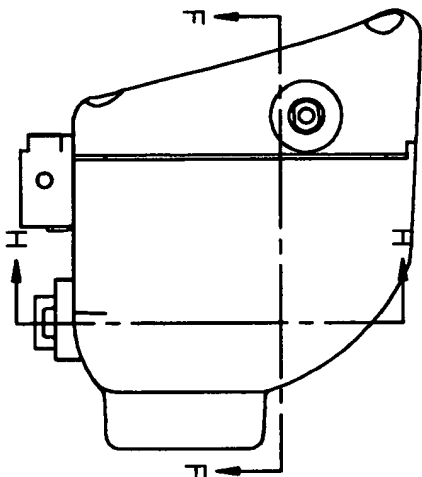
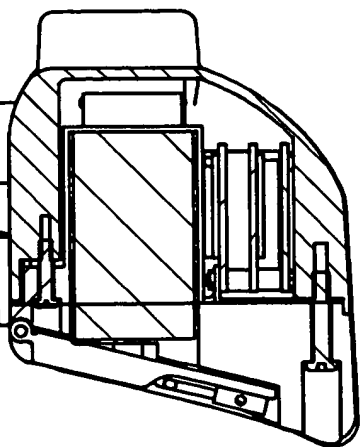
Item Number	Document Number	Title	Material	Quantity
1	20011	IR enclosure rear	TBD	1
2		VIRTUAL VISION LINE LOCK MOUNT		1
3		THERMAL CAMERA 2001	N/A	1
4	USB	USB A, SATA BATTERY	N/A	1
5	20013	Virtual Vision PCB	N/A	1
6	20014	Power Dec	TBD	1
7		PC board for camera	N/A	1
8	20019	IR enclosure front	TBD	1
9	CAT. NO. 209	Snop On contact	Nickel Spring	2
10	20012	Mounting Bracket	SHEET, 2024, 18 GAUGE 0.040 3" THK	1
11	DZUS PIN	RETAINER 1/4 TURN PRESS IN	Brass	1
12	3132	groove pin	SS	1
13	Hex 6 for camera bracket	Hex Socket Bolt Head No 6	0	3
14	DZUS PIN	FASTENER 1/4 TURN SIZE 4 RING HEAD	SS	1
15	DZUS PIN	STUD RETAINER SIZE 4 SHAP RING SS	SS	1
16	Hex 4 for camera mounting	Hex Socket Bolt Head No 4	0	2
17	908254721	Phillips Fan Head Machine Screw, No 6	0	3
18	908254721	Phillips Fan Head Machine Screw, No 6	0	3
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Item Number	Document Number	Title	Material	Quantity
22	20007	BRACKET, C-SLOT	SHEET, AL, 2024, 20 GAUGE 10.032" THK	1
23	20019	PEM Block NO. 4	aluminum	1
24	20017	Tired Block Seal	SILICONE SPONGE, BLACK, 0.32 THK	1
25	918284111	2mm machine screw nut	SS	3
26	MO504-25-4 L-0, R4F Electronics	4.5 mm x 5 mm ROUND SPACERS 25 mm HOLE	aluminum	2
27	Phillips Fan Head Machine Screw, No 4	Phillips Fan Head Machine Screw, No 4	0	4
28	20015	BATTERY DOOR SEAL	SILICONE SPONGE, BLACK, 0.32 THK	1
29	20018	PCB Bracket	aluminum	1
30	S-632-2-21	S-632-2-21, 6 PEM Seal	Seal	1
31	Phillips Fan Head Machine Screw, No 6	Phillips Fan Head Machine Screw, No 6	0	1

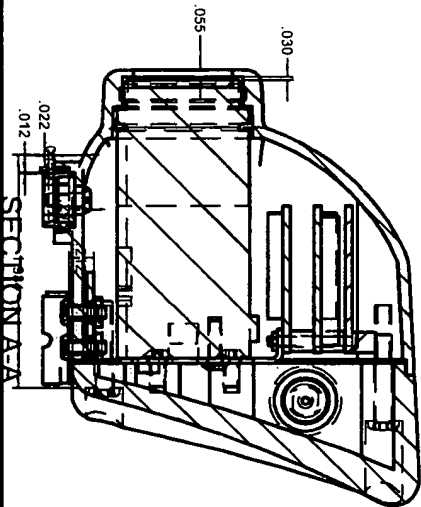
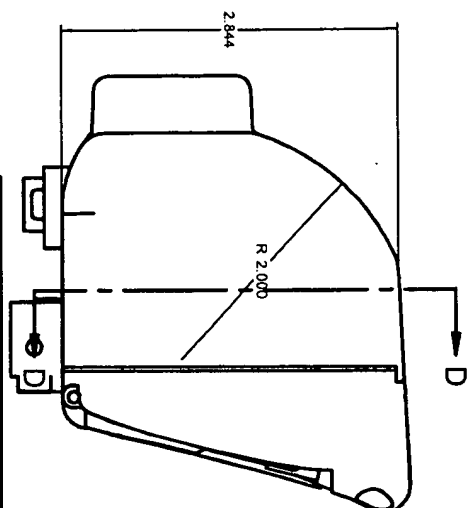
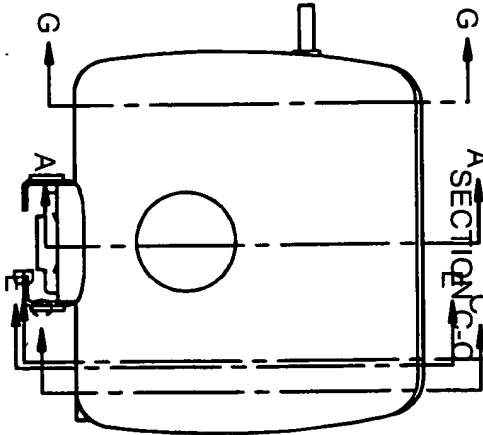
EXHIBIT B1

CONTRACT NO.		DATE	
APPROVALS		DATE	
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SAGE Technologies, Limited



SECTION H-H

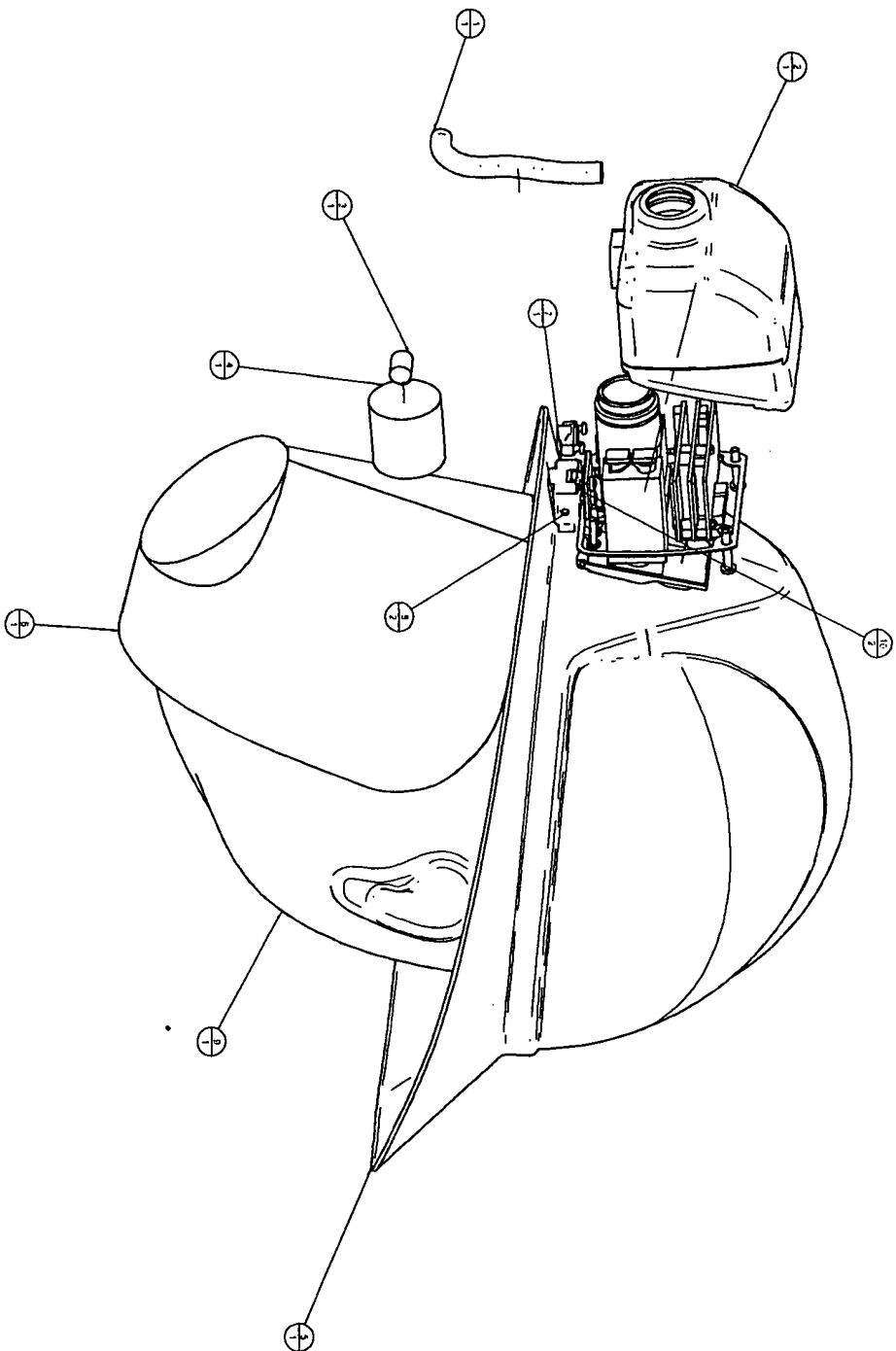


SECTION A-A

UNLESS OTHERWISE SPECIFIED
ALL DIMENSIONS ARE IN INCHES
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SURFACE FINISH TO BE 125/
UNLESS OTHERWISE SPECIFIED

CONTRACT NO.		DATE	
APPROVALS		DATE	
DRAWN C. Johnson		7/2/01	
CHECKED		NO.	
SAGE		SAGE	
SHEET		SHEET	

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100	100	10000	10000	100



SAGE Technologies, Limited	
Top Level System layout	
IR Camera	
Sheet	
SAGE Technologies, Limited	
Top Level System layout	
IR Camera	
Sheet	

Ultam
plastic
by the name of
Kontak

Common Glass
Protective Glass
transmission III

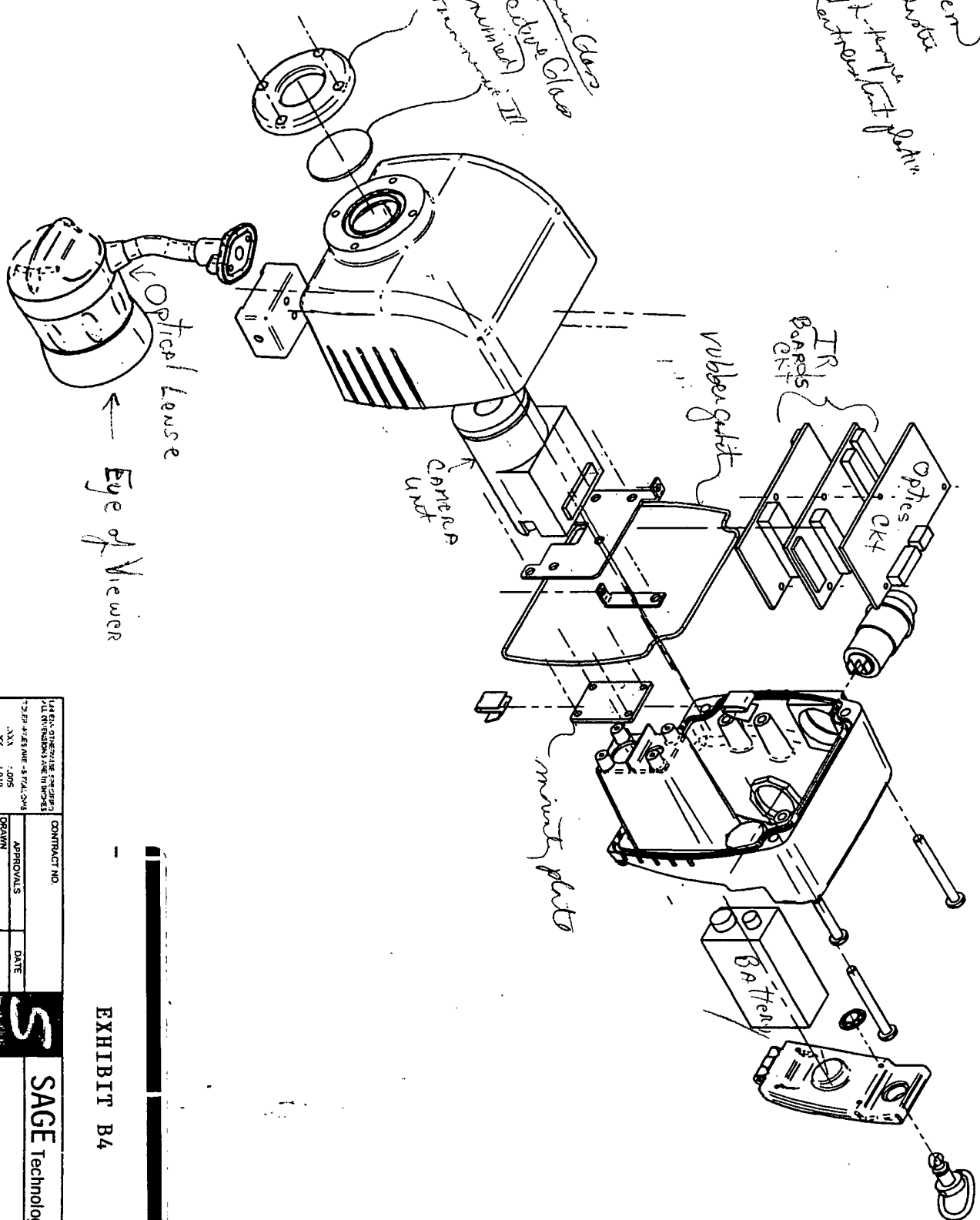
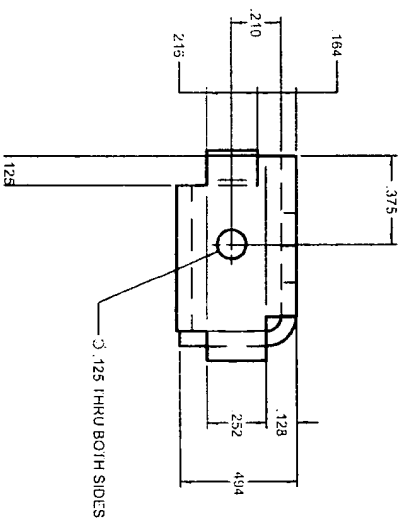
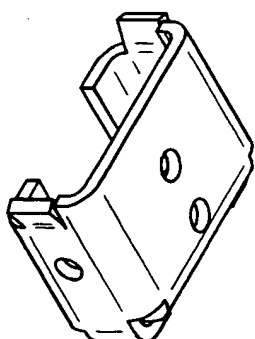
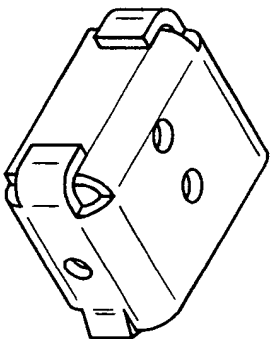
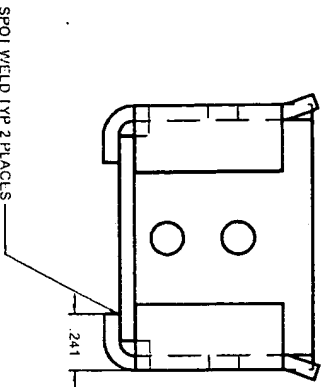
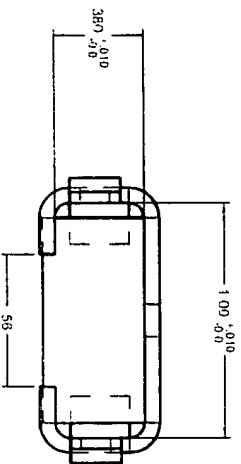
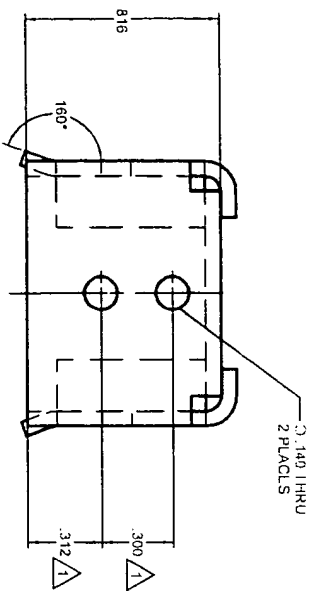


EXHIBIT B4

SAGE Technologies, Limited	
CONTRACT NO.	
DATE	
APPROVALS	
DRAWN	
CHECKED	
NO	
SHEET	



MATERIAL: SHEET, AL, 2024, 14 GAUGE(.0641THK)

UNLESS OTHERWISE SPECIFIED ALL DIMENSIONS ARE IN INCHES				CONTRACT NO	
TOLERANCES ARE AS FOLLOWS				APPROVALS	
.XXX ±.010				DATE	
.XX ±.030				CGJ	
ANGLES ± 0° 30'				9/4/01	
SURFACE FINISH TO BE				SAGE	
UNLESS OTHERWISE SPECIFIED				DRAWING NO	
V				20007	
				SHEET	
				1 OF 1	

SAGE Technologies, Limited

BRACKET, C-SLOT
IR CAMERA

→ WITHIN 5 DAYS OF RECEIPT

DELAWARE VALLEY INDUSTRIAL RESOURCE CENTER



An Affiliate of the NIST Manufacturing Extension Partnership

INVOICE

OK
WML 9/19/2001

Sage Technologies LTD.
2500 Maryland Road
Suite 502
Willow Grove, PA 19090

INVOICE NO: 14379

DATE: 8/30/01

Attention: Julius Olita

Salesperson	P.O. Number	Date Shipped	FOB	Terms
				Upon Receipt

Quantity	Description of Service	Unit Price	Amount
	Project # 9952068		
	New Housing Design		
	For Engineering and Design Support		
	For Material	\$ 1,240.00	\$ 1,240.00
SUBTOTAL			\$ 1,240.00
SALES TAX			
SHIPPING			
TOTAL DUE			\$ 1,240.00

MAKE CHECKS PAYABLE TO:
Delaware Valley Industrial Resource Center

PLEASE INCLUDE THE INVOICE NUMBER ON YOUR REMITTANCE

Invoice No. 14379

EXHIBIT C2

Strengthening The Region's Industrial Base For The Future
2905 Southampton Road • Philadelphia, PA 19154-1270
215.464.8550 • FAX: 215.464.8570 • <http://www.dvirc.org>



Virtual Vision

Virtual Vision, Inc.
7659 178th Place Northeast
Redmond, WA 98052
phone 206. 882.7878
fax 206. 882.7373

Invoice No: 0100038
Invoice Date: 08/20/01

INVOICE

Customer No: SAG0500
Customer Ph: 215/658-0500
Customer Contact: Owen Medd

OK *pm*

Bill To: Sage Technologies, Ltd.
Suite 502
2500 Maryland Road
Willow Grove, PA 19090

Ship To: Same

Terms: Net 30
Order #: PO # 1264

Project Manager: D. Soward

# Ordered	# Shipped This Invoice	Total Shipped on PO	Item	Unit Price	Extended Price
			Version 4 Interim Fire Fighter Helmet Display System		
			NRE Development Cost		
12	2	2	Prototype units		

Sales Total:
Sales Tax: 0.00
Shipping & Handling: 0.00
Other Charges: 0.00
Invoice Total:

Please make checks payable to Virtual Vision, Inc.

REMITTANCE COPY

EXHIBIT C3

SAGE TECHNOLOGIES, LTD

**MONTHLY PROGRESS REPORT
AUGUST 2001**

CONTRACT NO.: 4400026685

DATE: September 5, 2001

To: Science Application International Corporation
Attn: Jessica Dillon
P.O. Box 492
Ft. Belvoir, VA 22060

From: Sage Technologies, Ltd.
2500 Maryland Road
Suite 502
Willow Grove, PA 19090

Report Period of Performance:

1 August 2001 through 31 August 2001

1. TASK AREAS

- Completed housing fabrication for Helmet Mounted Thermal Imaging Systems. Urethane housings are available for HMTI integration and unit evaluation.
- One Raytheon camera delivered for first unit implementation. One additional loaner delivered that is suitable only for integration validation.
- Two OLED displays delivered for the HMTI implementation. One of the displays has been integrated into the HMTI.
- An Alphascope has been integrated into the HMTI system. It is currently being used for testing the HMTI system. It is expected that the Raytheon unit will be delivered for installation in Fairfax County, Virginia, in September.
- A High Core Raytheon system was implemented and operated using the unit. It is currently being used for testing the HMTI system. It is expected that the Raytheon unit will be delivered for installation in Fairfax County, Virginia, in September.
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2. TRAVEL ACTIVITY

- 8/18-8/21 – meeting with Virtual Vision to review, accept and integrate OLED display for helmet mounted system.
- 8/23-8/26 – attend and participate in the Fire Rescue International Conference.

3. POTENTIAL/PROBLEM AREAS

- Availability of the Raytheon cameras in the helmet mount configuration continues to be a concern. At issue is the delivery of the updated printed circuit boards that are still anticipated the end of September.
- A continuation of the unknown status of FY02 plus up constraining [REDACTED] ent plan.

4. MATERIAL PURCHASES

Ongoing:

[REDACTED] TI System
[REDACTED] TI
[REDACTED]
DVIRC design and modeling support for the Helmet Mounted TI System.
[REDACTED]

New:

Raytheon contract to provide prototype TIC(20)

SAGE TECHNOLOGIES, LTD

MONTHLY PROGRESS REPORT
SEPTEMBER 2001

CONTRACT NO.: 4400026685

DATE: October 2, 2001

To: Science Application International Corporation
Attn: Jessica Dillon
P.O. Box 492
Ft. Belvoir, VA 22060

From: Sage Technologies, Ltd.
2500 Maryland Road
Suite 502
Willow Grove, PA 19090

Report Period of Performance:

1 September 2001 through 30 September 2001

1. TASK AREAS

- Completed fabrication of two Helmet Mounted Thermal Imaging Systems. Systems being used for presentation/demonstration, and initial T&E purposes.
- Received additional TIC's from Raytheon the end of the month with updated PCB's. Also received additional display units from Virtual Vision. Anticipate fabrication and assembly of deliverable unit to the Army by mid October.
- Received evaluation protective lenses for mounting in front of the TIC. Anticipate device selection during the next reporting period.
- [REDACTED]
- [REDACTED]
- [REDACTED]
- [REDACTED]
- [REDACTED]
- [REDACTED]
- [REDACTED]

2. TRAVEL ACTIVITY

- 9/22-9/25 - attend and participate in IAFF meeting in Phoenix, AZ. Present and demo Helmet Mounted Thermal Imaging System.

3. POTENTIAL/PROBLEM AREAS

- A continuation of the [REDACTED] FY00 plus up constraining [REDACTED]

4. MATERIAL PURCHASES

Ongoing:

[REDACTED]
Virtual Vision contract to provide displays for Helmet Mounted TI System.

[REDACTED]
DVIRC design and modeling support for the Helmet Mounted TI System.

[REDACTED]
High Voltage Link Corp. 500 Watt transmitter/control unit

[REDACTED]
[REDACTED] contract to provide prototype TIG/DO